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SAVING THE TRADITIONAL VIEW OF CONTENTS FROM THE MESSY SHOPPER AND HIS CRAZY AND AMNESIAC ACOLYTES¹

SUMMARY: In this paper I propose a way of saving the traditional view of contents and attitudes from the threat posed by famous scenarios such as Perry's messy shopper. I argue that, with the solution I suggest, traditionally construed beliefs and contents can play all the roles we traditionally want them to play, including the notoriously problematic explanation of action. I dub the view laid out here the Double Belief Theory because it analyzes *de se* attitudes as, in fact, two conjoined beliefs, one of which is a second-order belief about the other.

KEYWORDS: *de se*, indexicality, beliefs, attitudes, propositions, centered propositions.

1. Introduction

It is widely accepted that the famous examples formulated by Perry (1977; 1979)—who was inspired by the work of Castañeda (1966; 1967)—and Lewis (1979) at least pose a serious threat to what I shall call here the Standard View of Contents (SVC), and specifically, to one of its two components, the Standard View of Attitudes (SVA). By the latter I mean a certain, traditional philosophical

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theory describing the properties and nature of the contents of propositional attitudes, especially beliefs. The former is a result of conjoining the latter with an, also traditional, theory depicting how linguistic communication occurs, that I shall call the Standard View of (Linguistic) Communication (SVL).

It is much more controversial, though, whether the aforementioned examples, and the arguments that they give rise to, indeed force us to reject the Standard View. Furthermore, even among those who agree on a positive answer to this question, there is further disagreement on how significant the departure from the traditional view needs to be. Therefore, we can distinguish three main families of positions that the proposed solutions to the problem could be categorized into: *de se* skeptics, *de se* condoners, and *de se* enthusiasts. The first attempts to answer the main question to the negative and, mostly, tries to look for the explanation of the phenomenon described in the crucial arguments outside of the realm of contents of attitudes. The next two, on the other hand, agree that some modification of the legacy position is needed, but only the *de se* enthusiasts are willing to reformulate the way we used to understand contents altogether.

The plan of this paper is as follows. First, I detail what claims I attribute to SVC and present a particular, famous scenario—the messy shopper—and explain why it poses a threat to SVC. Then, I describe the three aforementioned types of reactions to the problem revealed by the-messy-shopper kind of cases, which allows me to straightforwardly conclude that the underlying assumption behind all of those views is that SVC, understood as including a certain list of theoretical tasks that the traditionally construed contents are supposed to fulfill, cannot be saved (at least as long as saving it would require retaining every single task from that list). Next, I move to my own proposal of how the main problem can be answered without the slightest departure from SVC and present two different ways the proposal can be developed. In this paper I shall not argue for the superiority of SVC over the different proposals departing from it, so my project can be understood in the conditional manner: If one wants to save SVC from the problems stemming from Perry's cases, then what I describe below is hopefully the best way to it.

The first version of my proposal, which I introduce partly for presentation purposes in order to be able to contrast the second one with it, can strike many as very unintuitive. At the same time, given that it displays a wide range of, mostly theoretical, strengths stemming from providing a possibility of retaining the neat and familiarized traditional picture of contents, I think the idea behind the proposal is at least worth exploring and presenting for potential philosophical use. Having said that, I strongly prefer the second version which avoids the implausible consequences while retaining all of the advantages. Overall, given the crux of the idea, I shall call it the *Double Belief Theory* (DBT), and, respectively, its first version (DBT1) and second (DBT2). Finally, I address potential worries that could be raised against my preferred solution—(DBT2).

2. The Standard View of Contents

Before we get into the heart of the matter, I shall first characterize what the aforementioned SVC exactly states. I already hinted that according to how I interpret this view, it consists of two interconnected modules, one regarding the contents of attitudes, and the other concerning communication. According to SVA, belief (and other attitudes) is a two-place relation between its holder—the believer—and a certain proposition capturing the content of what it is that the holder believes. Beliefs, thanks to their contents, are naturally utilized within this traditional theoretical framework of SVA as able to potentially explain *action* and *agreement* or disagreement between agents. It is quite natural for us to think of Michael's belief *that it is going to rain* as explaining why he grabs an umbrella when going out. Additionally, if we had reasons to think that Mary also believes that it is going to rain, then the fact that the believed content is shared by Michael seems like a good explanation of the fact that Michael and Mary agree on the upcoming weather conditions. Two important features that SVA assumes about such contents are that they are *absolute* in the sense that, once established, their truth value is not sensitive to time or who the believer is, and *accessible* or shareable, i.e., believable by any agent (granted sufficient mental and conceptual development). An important terminological remark is that throughout the paper, as hinted above, I shall be distinguishing *contents* of beliefs from *beliefs* proper. The latter being construed, depending on one's philosophical preference, either as acts of believing, the mental states of believing, particular instances of the belief relation (hereinafter I am assuming the first), or as episodes of believing. The crucial point is that different people can believe that, say, the grass is green, i.e., the same content; but their beliefs, in the sense explained above, will nevertheless be numerically different because each of them captures that content in a separate belief act or episode.²

The second module, SVL, which can be traced to the work of Stalnaker, consists of two main claims. First, it states that the contents of utterances are the same objects as the contents of beliefs, i.e., the same kind of propositions (Stalnaker, 1999c, p. 151). Second, it asserts that a successful piece of linguistic communication follows a general pattern according to which when the speaker has a belief whose content she wants to communicate, she encodes it in an utterance, and if everything goes according to plan, the hearer should be able to decode that very content after receiving and understanding the message (Stalnaker,

² In other words, if belief, understood as one of the propositional attitudes, is a two-place relation between subjects and propositions, then beliefs, as I shall be using the notion here, are, formally speaking, particular ordered pairs being elements of that relation. (There is a further complication involving time that would allow the distinguishing of different belief episodes of the same agent towards the same content, but I am ignoring it here for simplicity).

1999a).³ When conjoined, the two above claims provide a picture of communication including a single proposition playing three roles: a) of the speaker's content she wants to convey; b) of the content semantically expressed by the utterance utilized by the speaker; and c) of the content the hearer acquires after correctly grasping the utterance.

Overall then, SVC is a grand and ambitious theory claiming the commonality of the contents of speech acts and the contents of beliefs, prescribing of those contents the features of absoluteness and accessibility, and expecting them to play the roles of explaining behavior and agreement, as well as occupying all three slots within the picture of communication.

3. The Problem of the *De Se*

Let me start my short presentation of the problem of the *de se* by introducing the aforementioned messy shopper scenario:

I once followed a trail of sugar on a supermarket floor, pushing my cart down the aisle on one side of a tall counter and back the aisle on the other, seeking the shopper with the torn sack to tell him he was making a mess. With each trip around the counter, the trail became thicker. But I seemed unable to catch up. Finally it dawned on me. I was the shopper I was trying to catch. (Perry, 1979, p. 3)

Intuitively, we could describe the belief that the fictional Perry possesses in the first part of the story (i.e., right after he notices the trail of spilled sugar) as a belief *that the messy shopper is making a mess*. At the same time, he seems to acquire some new belief the very moment he realizes that it is “he” who is spilling sugar (let me call this the moment of *epiphany*). It could be pre-theoretically characterized as the belief *that I—John Perry—am making a mess*. Additionally, it is exactly this change in his beliefs that we would like to refer to when explaining the change in the fictional Perry's behavior (like, say, the fact that he stopped following the trail of sugar and rearranged his cart).

The problem caused by this seemingly innocent scenario is that the change in the fictional Perry's mental states that is supposed to happen during the epiphany is surprisingly resilient to analysis within the standard frameworks of contents normally employed by philosophers, such as the possible worlds framework or structured propositions. Roughly speaking, this is so because no matter how we choose to interpret the content of the fictional Perry's beliefs from before and after the epiphany within any of those frameworks, we are either unable to locate the change we are after altogether, or the newly formed epiphanic belief's content lacks the indexical element needed for Perry to be able to use it to guide his behavior. If we allow the belief from before the epiphany to be *de re*, then we arrive at the first of the mentioned problems because the referent of “the messy

³ This view can be recreated from Stalnaker's well-known theories of assertion and common ground.

shopper” and “I” is the same. If it is to be analyzed as *de dicto*, then we make room for the change given that the belief following the epiphany is clearly *de re*, but Perry still needs to possess some additional indexical belief reflecting his awareness that Perry is “him”. Without this additional belief, we can easily imagine a case of an amnesiac Perry who is not aware of his identity, and therefore cannot utilize his belief that Perry is making a mess to guide his behavior. This is why the difficulty of capturing the belief contents that would allow us to comprehensively explain behavior is often called the *problem of the essential indexical* or the *de se* problem.

4. Reactions to the *De Se* Problem⁴

The leading version of the most radical reaction to the *de se* problem comes from Lewis (1979) who suggested that the reason for our inability to capture the content of the missing belief newly formed by the fictional Perry after the epiphany is that there are simply too few of them to choose from in the first place. In order to fix this, Lewis suggested that rather than modelling the beliefs as locating the actual world in a set of worlds in which the believed proposition holds, we should think about them as self-ascriptions of properties. It applies straightforwardly to the *de se* problem because now we can say that the property the fictional Perry self-ascribes before the epiphany is that of inhabiting a world in which the messy shopper is making a mess, while the property he self-ascribes after the epiphany is that of inhabiting a world in which he himself is making a mess. This allows us to capture the fine-graininess we are looking for.

These fine-grained contents are typically represented by employing so-called *centered propositions*. The name comes from the fact that the way they differ from standard possible worlds propositions is by possessing an additional parameter of the index of evaluation, namely the individual holding the belief (i.e., the one the belief is *centered* on). This grants the expected result that when the fictional Perry has the first personal belief to the effect that he himself is making a mess, he is locating himself within the individuals who are making a mess in the actual world. Formally, the proposition believed is:

$$(1) \quad \{ \langle w; x \rangle : x \text{ is making a mess in } w \},$$

and is true if and only if its holder (in this case the fictional Perry) is making a mess in w . Given that Lewis’s position is all about embracing the conclusions about the missing essential indexicality that could be drawn from the messy shopper scenario, and incorporating it into the contents of beliefs, I dub the sup-

⁴ For a wider discussion of some of the views proposed as a result of Perry’s original introduction of the *de se* problem, see Ninan (2016). Also, Kindermann (2016) and Rudnicki (2021) provide some context, especially with regards to how the different positions react to the problem of communication.

porters of this line of thought the *de se* enthusiasts. This camp, alongside Lewis, includes other theorists such as Weber (2013; 2016), Ninan (2010), Torre (2010), and others.

A slightly more conservative reaction to our problem was proposed by theorists that I call here the *de se* condoners. The name comes from the fact that even though they agree that the missing indexicality needs to find its place in order to save the practice of explaining actions, they are reluctant to make room for it within the contents of beliefs by modifying the way we view them. Perry (1979) himself, for example, proposed that we should place the indexicality at the level of what he called *belief states*. Belief states are somewhat similar to Frege's modes of presentation, in the sense that they are ways of believing traditionally construed contents. For example, the content *that (fictional) Perry is making a mess* can be arrived at by the fictional Perry through different belief states and, what is relevant to our case, among potential others are those of *the messy shopper is making a mess* and *I am making a mess*. In other words, in this view the content of the fictional Perry's belief remains constant throughout the scenario, but what does change, and what is supposed to explain the change in his behavior, is his belief state, which, after the epiphany, contains the indexicality we are after. A similar view also appealing to representations rather than contents when explaining behavior was proposed by Ciecierski (2020).⁵ Additionally, an interesting version of this approach was presented by García-Carpintero (2016; 2017), who thinks that the indexicality should be located in the reference-fixing linguistic presupposition of the agent that accompanies the thought he expresses with, say, "I am making a mess". The presupposition can be characterized, by a token-reflexive linguistic rule like *the thinker of this thought*.

The last family of views that I want to discuss is that of the *de se* skeptics, according to whom the conclusions to be drawn from the messy shopper kind of cases should not be all that revelatory. They either believe, such as Cappelen and Dever (2013), not only that the standard approach towards contents should remain unchanged, but also that the supposedly missing indexicality does not need to make its way anywhere into the wider picture of beliefs and their representations; or that, like Magidor (2015) (who, for reasons of brevity, I shall leave aside in this paper for the most part), the only thing the scenarios show is the fact, well-enough argued for already, that the standard views of content are insufficient. According to Cappelen and Dever, when explaining the messy shopper's action, we should not appeal either to the contents of his beliefs, nor to the way they are represented alone, but rather to the fact that different actions were available to him before and after the epiphany (Cappelen, Dever, 2013, pp. 49–52).⁶ Magidor, on the other hand, believes that solutions like the one proposed by

⁵ As he remarks about the behavior-explaining role of his characters who display a far-reaching level of similarity to Perry's belief states, Kaplan (1989) explicitly states that he could also be treated as a member of the *de se* condoners camp.

⁶ To be more precise, it is rather the combination of the agent's believed contents, intentions, and actions available to him that is relevant.

Lewis should be avoided because they do not answer the worries that typical Frege cases pose to the standard views of contents, and therefore, that a theory providing a remedy to both types of problems at one blow is preferred.⁷

5. The Reactions vs the Tenets of the Standard View of Contents

This section concludes the stage-setting part of the paper by discussing how the corrections to SVC suggested by the different reactions to the problem of the *de se* impact the five theoretical roles and features attributed to contents by SVC mentioned above: explaining action, explaining agreement, absoluteness, accessibility, and being sufficient to describe communication. (Recall that given that I am not trying to argue for the superiority of SVC, not conforming to any of its tenets should not be understood as an objective weakness of any of the views. Rather, it can be seen as an issue only relative to the actual aim of mine in this paper, which is merely to propose a way of saving SVC).

De se enthusiasts do well when it comes to being able to explain actions by referring to contents, which is obviously not surprising, given that their position is, as already explained, purposely designed to do so. Also, they do not run into problems when claiming that the type of contents they propose are universally accessible. After all, the fictional Perry can believe (1) just as well as any other agent (with enough conceptual complexity). The only difference between the situations of (1) being believed by different agents is that this centered proposition will be true or false depending on the situation of every particular of its holders. And this brings us to the fact that *de se* propositions are, by definition, not absolute. If a content's truth value is dependent on anything other than the world, it is relativistic. In this particular case, it is agent-relative.

Furthermore, this view is also notoriously difficult, or perhaps simply impossible, to reconcile with SVL. If we imagine the fictional Perry trying to communicate (1) to Jane, what SVL predicts is that (1) is the content semantically expressed, and also the one acquired by Jane as a result of the successful communication. But this outcome is clearly wrong. On SVL, if Jane were to believe (1), what she would come to believe would be, contrary to expectations, the proposition that is true once she, being the proposition's center now, and not Perry, is making a mess.

By the same token, Lewis-like positions fall into problems when it comes to explaining agreement in the fashion expected by the standards of SVC. When Perry and Jane both share a belief in (1), contrary to SVC's dictum, it does not follow that they really agree on anything substantial. In fact, we could easily imagine Perry believing that Jane is not making a mess, and Jane believing that Perry is not, while still both sharing (1). This seems to miss the intuitive conception of

⁷ One of the alternatives Magidor discusses is treating contents as <proposition; mode of presentation> pairs.

agreement since there is no actual matter they could be convincingly said to agree on. Overall then, the *de se* enthusiasts score on two out of five tenets of SVC.

Let us move on to the *de se* condoners. They definitely do not share the issues with agreement explanation with the enthusiasts. That is because the general view of contents is not modified here when compared to SVC. The same thing can be said about absoluteness. The action explanation tenet is also straightforward to assess. Given that the condoners appeal to belief states or other forms of mental representations in this regard, it is rather a feature (and not even a consequence) of their views that actions, at odds with SVC, are to be explained without referring to contents.

Next, even though, arguably, the positions belonging to this family might have problems with providing a successful account of linguistic communication,⁸ at least at the basic declarative level, the standard model of communication is preserved.

The situation is a bit less evident with the last tenet: accessibility. As Perry (1979, p. 19) himself famously wrote, his position implies a *benign form of limited accessibility*. What he means by this is that every existing content is in principle accessible, but not through every possible belief state (representation). So, for example, Jane is able to arrive at the public content that she is making a mess via a first personal belief state, but nobody else is. It is not completely obvious whether this is good enough from the perspective of SVC. Even though the accessibility of contents is maintained by the condoners, their position somehow still feels contradictory to the spirit of SVC. This is mostly because of the natural intuition expressed by Stalnaker (1999b, p. 148) that what the messy shopper kind of case seems to show is that the indexicality we are trying to make room for is essential at the level of information and not representation, i.e., at the level of contents rather than belief states. In other words, Perry's discussion leaves it unclear in what sense his belief states are anything different from contents.

No matter what one thinks the verdict should be here, what is most relevant to my discussion is that there is an obvious tension between the triad of allowing indexicality either at the level of content or representation, absoluteness, and accessibility. Even if we granted the condoners that they abide by the requirement of absoluteness after all, they still fall short with regards to SVC's preferred way of explaining action.^{9, 10}

⁸ For example, they lack a straightforward way of explaining the informativeness of utterances such as "It is twelve o'clock now" made at twelve. This seems to be part of a wider problem though, so I will not delve into this issue here.

⁹ An anonymous reviewer suggests that I should include a mention of how Perry's later views might align with my classification. This is nicely illustrated by the following quote from the paper of de Ponte, Korta, Perry (2023), which discusses misconceptions about Korta and Perry's doctrine of "Critical Pragmatics" (2011). Their discussion suggests that Perry's views have not undergone any radical changes that would warrant a reclassification:

Perry's views on *Reference and Reflexivity* were a development of his *rejection*, in *The Problem of the Essential Indexical* (1979), of what he called "the doctrine of

Finally, let me very briefly go through the relation between Cappelen and Dever's claims and SVC.¹¹ As explained above, the only thing they say which could be relevant for our discussion is that in explaining actions we should employ the idea of action inventory. This is also the only place where they seem to come into disagreement with SVC because they strip the contents of their major role in this regard.¹²

Overall then, just as I signaled in the introduction, even though they differ in the extent, every single family of reactions to the *de se* problem shares the common assumption that SVC, as defined here, cannot survive when confronted with the messy shopper cases. Here is where my DBT comes in, claiming that there is a way to put all the pieces of the puzzle together. The following sections are devoted to the presentation, discussion, and development of the two versions of my proposal, as well as, finally, responding to objections to the second version.

6. The Double Belief Theory

DBT concedes that the right way to explain the mental change the fictional Perry undergoes during his epiphany is not by appeal to his first-order beliefs. It claims, though, that we are still able to describe the change in his beliefs that occurs at that moment without being forced to abandon any tenets of SVC. The way to do it is by employing a second-order belief. This can be done in two ways, which give rise to the two versions of the view: DBT1 and DBT2. Before the epiphany the content of Perry's belief is the totally typical proposition:

- (2) $\{\langle w \rangle: \text{Perry is making a mess in } w\}$.¹³

propositions". This is basically the view that propositions are the objects of the "propositional" attitudes, and that belief, for example, consists in a relation to a proposition. (de Ponte, Korta, Perry, 2023, p. 915)

¹⁰ For a thorough discussion of this tension, see Ninan's (2016, pp. 110–113).

¹¹ As mentioned above, brevity demands leaving Magidor (2015) to one side. Her main points are mostly negative, but even taking her as actively supporting one of the heterodox views of propositions, we would have to conclude that in relation to SVC she is probably willing to sacrifice most tenets of SVC except for action explanation and, perhaps, absoluteness.

¹² I decided not to include a detailed discussion of Cappelen and Dever's view. This decision was based on two main reasons: firstly, such a discussion would sidetrack the paper's natural flow, as my focus is not on evaluating the success of their view. Secondly, and crucially, the relevant literature already provides exhaustive analyses of their approach. For instance, a critical discussion on the suitability of the action inventory model for its intended purpose is extensively covered in García-Carpintero (2017, pp. 263–268).

¹³ As explained before, the pre-epiphanic content can be analyzed as either *de dicto* or *de re*. Even though I take the former to be more natural, at least in the standard version of the story, I decided to assume the latter motivated by the ease and uniformity of presentation that it provides in the remaining parts of the paper. Also, once it is assumed to be *de re*, it makes no difference whether it contains "Perry" or "the messy shopper" in how it is

When the epiphany happens, and he starts thinking to himself “I am making a mess”, the proposition believed does not change. Nevertheless, he gains a new belief. The way to fit the indexicality into the picture, though, is neither by introducing it straight into the referential element of the content (as Lewisian *de se* enthusiasts do), nor into the representation (as the condoners do), but rather into the predicative element (that is itself not indexical!) of the newly believed second-order proposition. Here is also where the two versions of my view start to diverge. Let me begin by discussing DBT1 first. According to DBT1, the content of the second-order belief is about the first-order content (2):

(3) $\{\langle w \rangle: (2) \text{ is a first personal content in } w\}$.

In other words, the difference in the contents of the fictional Perry’s beliefs is not to be located at the ground level, but rather at the level of what he takes those contents to be. Note that since we do not want to appeal to centered propositions, we need to say that (2) is believed by Perry throughout the story. What does change is that he first thinks of the content captured by (2) as of some non-first-personal content, and the epiphany causes him to believe that (2) is first personal. Now, we can simply explain Perry’s change in behavior by additionally appealing to his newly formed belief in (3) that he clearly lacked before the epiphany, and the fact that he unchangeably believes (2) throughout the story stops being a problem. Had he not realized the sugar was spilling from his cart, he would not have formed a belief in (3) and in result would not have rearranged his cart.

With such a view we are also doing very well when it comes to conforming to the other tenets of SVC. Agreement is to be explained in the most natural way by simply referring to contents. Nothing changes in this domain once we introduce the second-order contents such as (3). So, once the fictional Perry has a belief he could express with “I am making a mess”, and Jane has a belief about Perry she could express with “He is making a mess”, they are in agreement because they both share the belief in (2).

Note that once we allowed the second-order contents of beliefs into the picture, the fact that both Perry and Jane believe (2) is not enough to predict that they both start behaving in a similar manner, like rearranging their cart or starting to clean up after themselves. That is because as long as Perry believes both (2) and (3), Jane’s belief in (2) is accompanied by (4) (and not [3]):

(4) $\{\langle w \rangle: (2) \text{ is a third personal content in } w\}$.

laid out, since they happen to co-refer. Readers who find this unacceptably unintuitive can think of the version of the story involving Perry before the epiphany seeing himself in the mirror spilling sugar without realizing that he is looking at himself. Here his starting belief is intuitively *de re*.

This difference is decisive to the fact that it is Perry who rearranges his cart while Jane remains careless about hers.

Furthermore, DBT1 keeps the contents absolute. We already saw that (2), obviously, remains so, but the situation with second-order ones is not different. The second-order contents are also not relativized to any other feature of circumstances than worlds. Their truth values depend, as far as DBT1 is concerned, only on the properties of the first-order contents they are about (in fact, for DBT1, they are always false—more on that later).

Analogously, when it comes to accessibility, nothing is changed from SVC's ideal. The first-order contents remain accessible, and the second-order ones do not pose problems either. For example, anyone is able to have the belief that the content of Jane's belief in (2) is third personal (i.e., believe [4]) or that the content of Perry's belief in (2) is first personal (i.e., believe [3]). It should be noted, though, that just as with the communication of such contents discussed below, it is not unreasonable to assume that, forming such second-order beliefs about other peoples' beliefs is probably a relatively rare practice.¹⁴

Finally, communication works just as expected by SVL, too. First-order contents are, again, beyond any suspicion, but given that the second-order contents are accessible to anyone and absolute, they do not give rise to the problems acquired by Lewisian theories either. Their contents can be, at least in principle, expressed in utterances and transferred to their receivers, even though, arguably, the communicative purposes of doing so are probably close to nonexistent.¹⁵ The most relevant part, then, is that the standard way of thinking about contents stays unchanged and that is what allows SVL, and SVC as a whole, to thrive.

7. Problems of DBT1 and the Presentation of DBT2

In this section, I would like to highlight and discuss some potential problems that might be raised against DBT1. First is the most natural worry of unintuitiveness. Yes, I acknowledge the fact that DBT1 is definitely unintuitive. I think that it might be thought of as somewhat analogous to epistemicism in the debate over vagueness.¹⁶ On the one hand, most people see it as pre-theoretically implausible, but, at the same time, the view possesses such theoretical merits, understood as fitting neatly into the wider philosophical landscape, that it should not be dismissed without first being taken seriously.

The unintuitiveness comes from two main directions. First, DBT1 seems psychologically implausible. That people form beliefs with second-order contents (of the sort proposed by DBT1) just does not feel right at all. When I think about

¹⁴ It seems that it is not that rare in philosophy. This practice seems well-established in analyzing typical cases involving mirrors and agents forming beliefs about themselves without realizing that they are thinking about themselves, and comparing them to ordinary beliefs about oneself.

¹⁵ At least when assuming the standard view of communication.

¹⁶ I borrow the metaphor from García-Carpintero (2017, p. 261).

my belief that Rome is beautiful, there is a sense in which I can almost feel this belief located in my head. On the other hand, when I try to think about myself in a first personal way, it is simply not the case that I see myself as believing that the content of my other belief has the property of being first personal. In other words, something seems to be off here on the phenomenological level. At the same time, this problem becomes significantly less acute when DBT is combined with non-representationalist views of beliefs such as dispositionalism or interpretationalism. But even representationalist frameworks seem to possess tools usable for diminishing problems of this sort. Appealing to implicit beliefs might be one of them, and to believing without accepting another.

Furthermore, one of the main lessons to be drawn from the externalist revolution of the '70s and '80s is that relying on introspection when judging what the contents of our beliefs are is a misleading practice. Even though this analogy is, of course, heavily deficient, it should be nevertheless good enough to mellow the second source of unintuitiveness related to DBT1, which is the fact that Perry's belief that (3) (or Jane's belief that [4]) is, contrary to expectations, false. That is due to the fact that once we stick to the traditional absolute conception of contents, those contents can be neither first nor third personal, etc. In other words, what DBT1 implies is that humans are continuously misled in their practice of belief-forming by some kind of a wrong implicit theory of contents, according to which properties of being first or third personal may correctly describe them.

The question now is whether this fact should disqualify the theory. I think a quick glance at the philosophical literature regarding the nature of contents suggests otherwise. After all, it is only a rhetorical question to ask if the theorists specializing in this topic differ in their conclusions with regards to the nature of beliefs. In other words, no matter which of the available theories of contents turns out to be correct (if any), the proponents of all the views incompatible with it must have been misled, just as laypeople might be, even if the reasons that led them astray might be of a somewhat more theoretical than psychological nature.

But there is also the second (therefore, DBT2) way of fleshing out the details of DBT, and this is the one that I strongly favor over the previous. The first difference is in how the second-order contents are analyzed. As we saw earlier, according to DBT1, the second-order contents concern the contents of the beliefs from the first level. In DBT2, on the other hand, they concern the acts of belief, as explicated at the beginning of the paper. So, if we called the fictional Perry's act of belief in (2) B_P , and the act of Jane's belief in (2) B_J , we could characterize the contents of their second-order beliefs thus:

(3*) $\{\langle w \rangle: B_P \text{ is a first personal belief in } w\}$;

(4*) $\{\langle w \rangle: B_J \text{ is a third personal belief in } w\}$.

The second difference, when compared to DBT1, is that, in the current approach, we claim that the pre-theoretical intuition about the existence of indexical beliefs that emerge from the messy shopper scenario is not solely captured by

the second-ordered contents (as the previous version has it), let alone the first-order ones, but that it is captured by the conglomerate of both. In other words, the fictional Perry's epiphanic belief in (3*) is true if and only if he believes both (2) and (3*). This solves the problem very neatly because it seems that, conceptually speaking, it is perfectly sufficient for Perry to believe that Perry is making a mess, together with believing that that belief, B_P , is first personal, to be truthfully attributed a first personal belief to the effect that he himself is making a mess. In other words, what more could there be to Perry's indexical belief that he is making a mess than for him to believe that Perry is making a mess and think about that belief as first personal? Is not thinking of one's belief in a certain way a plausible explication of that belief being as it is thought of (at least for some class of its potential properties)? For example, somewhat analogously, if I believe that Picasso is the greatest painter, and at some point start thinking (believing) this belief is a thing of the past, is that not equivalent to saying that I used to believe that Picasso was the greatest painter, but I no longer do?

This idea bears similarity to the relation between believing to believe that p (BBp) and believing that p (Bp). Shoemaker (1995) famously argued for the following relation: $(Bp) \rightarrow (BBp)$; but he suggested that $(BBp) \rightarrow (Bp)$ might be true, also. Baumann (2017) argued for the latter at more length, too.¹⁷ The basic idea here is that once one has a second-order belief that one believes that p , there is a clear sense in which one must be aware of the question of whether p is true. And if so, then it is natural to think that one must have the disposition to answer such a question in the positive—which is essentially equivalent to believing p —once one already believes that one believes that p is true. Additionally, once one believes that one believes that p , one will be disposed to use p in motivating one's behavior, reasoning, etc. But this is exactly what a person believing p would be disposed to do too. These considerations are also connected to Moore's paradox, since they provide an interpretation for why utterances of and beliefs that p but *I do not believe that p* are infelicitous by explicating the interesting relation between believing that p and believing that one believes that p , hinted at above.

These ideas provide perfect insight into the crux of DBT2. If we think about the fictional Perry's belief that (3*), the fact that he holds it means that there is a sense in which he is aware of the question of whether his B_P is first personal or not. Given that he believes it to be (as his belief in [3*] states), it means that he will be disposed to behave (and reason) just as if B_P were indeed first personal (i.e., rearrange his cart). And again, just as in the case of BBp above, this is essentially the same as having a first personal belief whose content is still (2). This result is, of course, not available unless Perry forms a belief that (3*) in addition

¹⁷ The explication of my idea along these lines is indebted to the two mentioned papers. Also, for the offered way of thinking to be useful for my purposes, the latter rule need not be completely universal. Its plausibility for a wide range of contents is perfectly enough for me. In other words, I do not need to assume the controversial claim that there are no counterexamples to it.

to the one that (2). Note also, that *I believe that B_P is first personal, but it is not*, as potentially uttered or believed by Perry, is problematic in a similar way that typical incarnations of Moore's paradox are (or simply a version of it, depending on how exactly it is to be defined).

Overall then, there seems to be a class of properties of beliefs, such as whether they are believed at all (as the rule " $BBp \rightarrow Bp$ " suggests),¹⁸ or whether they are first personal, or perhaps whether they are a thing of the past (as my previous Picasso example suggested) that might be imposed on them from above, in the sense of trickling down from the contents of one's second-order beliefs. Note too that this kind of solution is not available for DBT1, since at least some aspects of contents of first-order beliefs cannot be so modified. Specifically, given that we are working here with the SVC framework according to which there are no first personal contents, one cannot simply impose the first-personality on the content of first-order beliefs from above.¹⁹

So, if we assumed for illustrative purposes that the so-called PRO reports do, in fact, capture the essence of the contrast between *de se* beliefs and other forms of *de re* beliefs, the idea behind the currently discussed solution could be presented in the following way.

- (5) I believed PRO to be making a mess.
- (6) I believed I was making a mess.

If we think about the truth conditions of (5) as uttered by the fictional Perry, it seems that it is true only when Perry had a first personal belief attributing the property of making a mess to himself. At the same time, (6) would also be true if Perry saw himself making a mess in the mirror without realizing at the time (but only later) that the person he is looking at is in fact him. For the report expressed in (6) to be true, then, it is enough that Perry believed (2). But for (5) this is not enough: it becomes true only once Perry, additionally, forms a belief in (3*) during the epiphany. What is very interesting about his belief that (3*) is that once the belief that (2) is already in place, (3*) becomes true simply by virtue of its being believed. That is because it is the whole consisting of (2) and (3*) that makes (3*) true. Or to put in the mentioned terms, the belief that (3*) imposes on the belief that (2) from above the very property of being first-personal that makes (3*) true.

On the other hand, had Perry not seen the trail of sugar at all and had he not formed (2), he could not be judged to have a first personal belief to the effect that

¹⁸ By this I mean a situation in which at some point I form a belief that I believe that p without ever forming a belief that p before. This way, given the rule, I have formed the latter once I have formed the former.

¹⁹ Other restrictions would probably involve typical cases motivating externalism. Once I have a belief about XYZ-water, the fact that I believe that belief to be about H₂O-water arguably cannot change its being about XYZ-water.

he is making a mess, even if (for whatever reason) he was to form the belief in something like (3*) (i.e., some similar proposition but not about B_p that would not exist). This is another way of saying that both (2) and (3*) are separately necessary and jointly sufficient for (3*) to be true (and for [5] to be a true belief report).

The other thing to notice is that the view is not threatened by the philosophers' favorite cases of amnesiacs or people falsely believing themselves to be eighteenth-century Scottish Enlightenment philosophers. If we imagine the crazy Heimson, who believes himself to be Hume, buying groceries and finding himself in a messy shopper situation, the constant belief he holds during the whole scenario is *that Heimson is making a mess* (it is at first expressed by "the messy shopper is making a mess" and after the epiphany by "I am making a mess"), and the one he forms as the result of the epiphany will, again, be a version of (3*). This is enough to attribute to him the indexical belief to the effect that he himself is making a mess, and to explain why he stops and rearranges his cart. This also provides evidence that the combination of the two aforementioned contents really is all there is to indexical beliefs. If the combination was not good enough, one would expect that the fact that Heimson believes himself to be somebody other than who he actually is could somehow get in the way.

The whole situation is totally analogous to Jane and her third personal belief about Perry. She does have the indexical belief about him only once she believes both (2) and (4*). And again, once (2) is in place, (4*) is self-veridical in the sense that it is enough for its own truth. Overall, then, (2) and (4*) are both necessary and jointly sufficient for the truth of (4*).

Even in this version of the view, we are able to maintain all the theoretical tenets of SVC. We explain Perry's action thanks to his newly formed (3*) which, this time, as explained above, is a true belief. The agreement between Perry and Jane is explained by appealing to (2) which they both believe to be true. All of (2), (3*), and (4*) are absolute since their truth depends only on worlds. With regards to linguistic communication, nothing has changed since the previous discussion of DBT1.

And, finally, the interesting result is that not only are all of (2), (3*), and (4*) accessible, but that their combinations are accessible, too (which should not be surprising given the first fact, but is still an interesting result, nevertheless). This means that Jane can, in principle, believe in a first personal way that Perry is making a mess once she believes (2) and (3*). But this is only in semantic or metaphysical principle. In reality, Jane cannot believe the exact same content captured by (3*) because this is a *de re* second-order belief about Perry's belief B_p . I think it is totally reasonable to claim that beliefs, as some type of mental acts or entities, are available for thinking about in the *de re* fashion only to their holders, just as, say, qualitative mental states, such as pain, are. The important thing to note though is that the impossibility of Jane's having the *de re* belief about Perry's belief B_p is not of metaphysical or semantic, but epistemological. She is simply not properly related to that belief (or acquainted with it, to use the more classic notion) in order to be able to have the *de re* belief about it. In other

words, my view assumes a non-liberal view of singular thought, i.e., one requiring some form of acquaintance with potential objects of such thoughts. In this particular case, the acquaintance with the object of the second-order belief would be provided by introspection, just as it is typically conceived for qualitative states, such as pain.²⁰ I do not want to commit myself here to any particular theory of belief introspection, but for example, one could think of ascribing to them particular phenomenology. What needs to be stressed, though, is that the phenomenology of any belief cannot itself be of perspectival (especially first personal) nature since it would yield such beliefs non-accessible for strong semantic and metaphysical reasons, as I have called them, and not for purely epistemological ones. Finally, the claim here again is not the highly implausible one that one cannot have *de re* thoughts about what other people are thinking, i.e., about the contents of other people's beliefs. My view states precisely that one cannot have a *de re* belief about another person's particular belief, understood as an act of believing, located in another person's brain.

Note also that the merely epistemic barrier separating, say Jane, from having Perry's *de se* belief, is enough to solve the problem posed by Perry (2006) (this time the philosopher, not the messy shopper character) in his discussion of Stalnaker's (1999b) diagonal proposition view. In short, the problem is that if the content(s) proposed as the analysis of *de se* attitudes can be believed not only by agents undergoing such attitudes but also by those who are not, such an analysis has to be incorrect. My view is not endangered by this worry because the epistemic acquaintance requirement is enough to make the antecedent of the conditional in the previous sentence false.²¹

²⁰ These considerations are partially motivated by the alleged possibility of reading one's acts of believing from, say, a future advanced EEG machine. I would like to thank an anonymous referee for raising this issue.

²¹ This might be the right place to consider a suggestion from one of the reviewers regarding a comparison of my proposed view with that of García-Carpintero (2016; 2017). There are notable similarities between our views, especially evident in García-Carpintero's description:

When the shopper makes the epiphanic judgment that his acceptance of "I am making a mess" expresses, he is on this view judging a singular content, *x* is making a mess, with him assigned to *x*, and he is presupposing (in the indicated sense, i.e., as a background belief of his, relevant for the epistemic evaluation of the judgment) another singular proposition about him, to the effect that he meets that condition. (2017, pp. 271–272)

However, García-Carpintero's analysis of the second type of content as token-reflexive differs significantly from my approach, which revolves around second-order beliefs about acts of believing. This difference leads to divergent consequences. In particular, García-Carpintero's view inherits from Perry's (1979) the same kind of "indexical" limited accessibility of the semantic or metaphysical sort (2016, p. 194) which contrasts with that of the epistemological sort stemming from my proposal. Additionally, García-Carpintero explicitly states that his position does not align with SVL (2016, p. 195).

There is one more result brought out by this version of the view that I would like to discuss. Going back to the mad Heimson, Lewis (1979, pp. 524–526) argues that Heimson and Hume should be considered as believing the same thing when they both believe themselves to be Hume, even though, there is a sense in which they do not believe alike. The standard, intuitive reaction, and especially typical of the perspective of SVC that we are interested in here, is that Lewis gets this the wrong way round. Heimson and Hume do not believe alike, even though, there is a sense in which they do. This fact gets captured very neatly by the version of my view under discussion here. The non-existence of agreement is explained by the fact that there is no relevant believed content that Heimson and Hume share:

- (7) $\{\langle w \rangle$: Hume is identical to Hume in $w\}$,
- (8) $\{\langle w \rangle$: Heimson is identical to Hume in $w\}$,
- (9) $\{\langle w \rangle$: B_{HU} is a first personal belief in $w\}$,
- (10) $\{\langle w \rangle$: B_{HE} is a first personal belief in $w\}$.

The relevant contents of the beliefs of Hume are expressed by (7) and (9), and of Heimson by (8) and (10). These two combinations of believed contents are enough to ascribe to them both the indexical, first personal belief to the effect that they are identical to Hume, even though, as we just saw, they do not share beliefs in any relevant contents. This way, we have the best of both worlds because we are able to explain the non-existence of agreement between them while also being able to provide some explanation for that *sense* in which there is something common about their mental states. Both pairs of believed contents (7) and (9), and (8) and (10), are enough for both Hume and Heimson to be able to truthfully self-ascribe (11):

- (11) I believe PRO to be (identical to) Hume.

The difference between their distinct, but nevertheless similar, first personal beliefs that they are Hume is that Hume's belief to that effect is true and Heimson's is false, because they track the truth values of (7) and (8) respectively. The mentioned similarity explains also why they are both disposed to behave in a Hume-like manner, i.e., react to the name "David", claim that they wrote the *Treatise*, and so on.

To sum up, according to DBT2, the mistake that all three types of views available in the literature made was that in searching for the missing indexicality, they assumed that it must be located within a single content. This assumption combined with the inability to find such contents forced the *de se* enthusiasts to propose the new kind of contents that are able to singlehandedly be indexical, and the other two positions either to appeal to representations, or to abandon the search for the indexicality and to become skeptics with regards to its value. My

view, on the other hand, dismisses this assumption and seems to be able to maintain all the relevant features of ordinary contents, as well as capture those of the allegedly indexical ones that turned out not to be that different from them.

8. Addressing Worries

In this section, I would like to address two *prima facie* problems of DBT2. The first is that similarly to DBT1, DBT2 is simply implausible when it attributes the second-order beliefs about beliefs to agents possessing *de se* attitudes. In other words, it seems unlikely that people form beliefs about their own beliefs on a regular basis, let alone attribute to those beliefs any perspectival properties.

The simplest answer on my part—and the one I briefly suggested when discussing the shortcomings of DBT1—would simply be to appeal to more instrumentalist approaches to belief²² such as dispositionalism or interpretationism, or to tools available even to a representationalist, such as implicit beliefs or believing without accepting. But we can also offer the following justification. First of all, notice that there is a significant difference between saying that a belief like (3*) is unlikely to be explicitly held by anyone (we could think of explicitly holding a belief as, e.g., mentally verbalizing its content, because something along these lines seems to be assumed in the worry), and that it would be implausible to ascribe a belief of this sort to someone. Even though I concede the first, the second claim seems unmotivated or perhaps even question-begging to me.

The next thing to note here is that the practice of attributing beliefs to subjects quite surely incapable of holding them in an explicit fashion (e.g., because of conceptual deficiencies or even more so simply because of lack of language), like non-human animals and human infants, is perfectly acceptable not only in everyday speech but also in scientific disciplines of comparative and developmental psychology, let alone philosophy. Even more importantly, the same is also true with regards to attributing beliefs to adult human beings, second-order beliefs included. Think for example about the phenomenon of cognitive dissonance,²³ i.e., a situation of conflicting beliefs (or attitudes more broadly; it may also involve an attitude-behavior combination), say B_1 and B_2 , causing a particular feeling of psychological discomfort. A very natural way of analyzing the cognitive state of an agent undergoing an episode of cognitive dissonance is by conceptualizing the feeling of discomfort as (or at least as phenomenally tied to) the second-order realization/belief to the effect that the two first-order beliefs,

²² An anonymous referee suggested that reading my proposed view through instrumentalist lines might be the most plausible approach. I concur with this perspective. Indeed, I view the debate on the contents of indexical beliefs as fundamentally revolving around the selection of a preferable conceptual scheme. Regrettably, a thorough argument in support of this understanding exceeds the scope of this paper and would necessitate a separate, dedicated discussion.

²³ Festinger (1957) is the *locus classicus* on the subject.

B_1 and B_2 , are in conflict,²⁴ even though it seems unlikely that people in described situations in fact explicitly think to themselves anything of this sort. I am not trying to suggest that this analysis has to be materially true. The point is rather that nobody would be willing to dismiss it simply on the grounds that it posits an *implausible second-order belief* attributing the relation of being in conflict to two first-order beliefs. And if we are willing (and rightly so) to allow this much theoretical room to the mentioned reconstruction of cognitive dissonance, I see no reasons why my theory of *de se* attitudes, DBT2, should be held to a stricter standard.

The second worry is that DBT2 is incredible because it analyzes *de se* attitudes in a way that precludes certain subjects that do not have a theory of mind (i.e., the capacity to attribute mental states) from having such attitudes, even though intuitively they are capable of first personal thought. Such subjects might include certain animals and young humans, roughly before the age of 4 (which is when it is normally thought theory of mind is acquired).

Even though I can understand where the worry is coming from, it has to be noted that things are not that straightforward. The argument presupposes at least three (but in fact more) things: that we have a decent idea of which animals are capable of first personal thought, that we have a decent idea of which animals have a theory of mind, that the former class is not contained in the latter, and that my view necessarily requires the possessors of the former quality to have the latter. I think all of these presuppositions are at least questionable (additionally, the worry presupposes also that we have an *intuitive* grasp of what belongs to the class of first personal thinkers—this one I take not only to be questionable but clearly false).

First is the conceptual problem: it is not at all clear what “being capable of first personal thought” exactly means. Arguably, this faculty requires more than just being capable of self-referencing, i.e., of comparing one’s phenotype against that of other subjects. This would clearly overgenerate because even some brainless creatures, like plants, can do that. Does it, then, take full-bodied self-consciousness (see Bekoff, Sherman, 2004 for a succinct discussion of related issues)? Here we are at risk of undergenerating since the typical methods of assessing self-consciousness, like the mirror test, turn out to be notoriously too difficult for many species of relatively intelligent animals.

But even if we assume that self-consciousness is the correct explication of the relevant capability—and here we get to the second, methodological, problem with the first presupposition—the mentioned methods of assessing self-consciousness are far from conclusive. It has often been raised that they are prone to yielding false negatives, for example, because of the tendency in some animals, like gorillas, to avoid eye contact (Shillito, Gallup, Beck, 1999). But

²⁴ Note that the sole fact of having two beliefs whose contents are in conflict is not enough to trigger the mechanism (think of Kripke’s [1979] Pierre who at the same time believes that London is pretty and that it is not pretty). This suggests that the analysis in terms of the second-order state is in place.

there are also reasons to worry about false positives since it is possible that some animals may pass the mirror test thanks only to the awareness of their body and not necessarily to full-blown self-consciousness (e.g., Heyes, 1994). Overall, I think it is fair to say that we are not even close to having the roughest of ideas about which animals are capable of first personal thought, and the abovementioned reasons for that are probably only the tip of the iceberg as to why.

Similar issues arise for the experimental results with regards to the second presupposition, i.e., our understanding of animals' and young humans' theory of mind. For example, there is significant evidence that chimpanzees acquire information about what their conspecifics see, but it is far from clear whether this finding should be described in terms of their reasoning about the mental states of the conspecifics or only about their behavior (e.g., Povinelli, Vonk, 2004; Tomasello, Call, 2006 for the differing approaches and discussion). In other words, just as in the case of first personal thoughts, we lack good orientation with regards to which creatures have a theory of mind, too.

Finally, there is nothing certain about the claim that my theory requires the agent undergoing a *de se* attitude to have a full-blown theory of mind, either. For example, there is a good amount of evidence that human infants at the age of roughly 12–24 months develop the potential for what is sometimes called *shared intentionality*, i.e., become capable of knowing what other people see and *intend*, can understand the idea of basic communicative common ground, etc. This is all well before the age when humans acquire theory of mind (which is at 4), and I cannot see why we would have to stipulate that a lot more than shared intentionality is needed to felicitously ascribe beliefs like (3*) to such subjects, especially given that in order to understand the idea of common ground one presumably needs at least some rudimentary level of understanding of perspective. Furthermore, some psychologists claim that theory of mind and shared intentionality are parts of the same developmental pathway and that it is the acquiring of the latter that should be taken as the “big leap”. This suggests that the difference between the two sets of skills might be one of degree rather than of type (Tomasello, Rakoczy, 2003).

To conclude, all three claims presupposed in the worry under discussion—that we have a decent idea of which animals are capable of first personal thoughts, that we have a decent idea of which animals have a theory of mind, and that my view requires the subjects undergoing *de se* thoughts to have a theory of mind—are doubtful, to say the least. This shows that the alleged intuitive data that the worry rests upon is not really data at all. The issues of self-consciousness and theory of mind in animals and young humans are very messy in every possible respect: empirical, conceptual, and methodological. For the time being, these cases are far from settled, and arguments like the one under discussion here cannot be used conclusively against DBT2.

9. Conclusions

In this paper, after introducing the problem the indexical attitudes pose to the standard view of contents, understood as a list of particular theoretical commitments, I argued that, contrary to the common assumption made by all parties reacting to that problem, we are not forced to abandon the standard view. It can be saved once it is realized that we are not limited to first-order contents when approaching the challenge. As I have shown above, the second-order contents attributing indexicality to first-order beliefs can perfectly well explain action in scenarios like the messy shopper while also retaining all the other crucial tenets of the standard view of contents.

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